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10/549,426

12/08/2006

Vincent Lauer

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08/27/2008

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FRANCE

EXAMINER

NGUYEN, THONG Q

ART UNIT

PAPER NUMBER

2872

MAIL DATE

DELIVERY MODE

08/27/2008

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

### Office Action Summary

**Application No.**

10/549,426

**Applicant(s)**

LAUER, VINCENT

**Examiner**

Thong Nguyen

**Art Unit**

2872

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 2 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 23 July 2007 and 28 July 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☒ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,2 and 4-12 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☐ Claim(s) \_\_\_\_\_ is/are rejected.
- 7) ☒ Claim(s) 1,2 and 4-12 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 08 December 2006 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
- Paper No(s)/Mail Date 7/23/07
- 4) ☐ Interview Summary (PTO-413)
- Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Response to Amendment***

1. The present Office action is made in response to the pre-amendments filed on 7/23/07 and on 7/28/08.

It is noted that in the pre-amendment of 7/23/07, applicant has amended claims 1, 4, 6-9 and 12 and canceled claim 3. There is not any claim being added. It is also noted that there is not any change to the abstract, the specification and the drawings in the pre-amendment of 7/23/07.

In the pre-amendment of 7/28/08, applicant has merely provided a list of claims in which applicant has corrected the status indicators of the claims in response to the Notice of non-compliance of 7/1/08.

### ***Information Disclosure Statement***

2. The citation of the publication number 2002/097485 A1 listed in the information disclosure statement filed on 7/23/07 fails to comply with the provisions of 37 CFR 1.97, 1.98 and MPEP § 609 because the publication number of the reference labeled as "2002/097485 A1" is incomplete. Applicant should note that any Publication has a total of seven numbers after the year the Publication is published. In this case, there are only six numbers appeared after the year of 2002. It has been placed in the application file, but the information referred to therein has not been considered as to the merits. Applicant is advised that the date of any re-submission of any item of information contained in this information disclosure statement or the submission of any missing element(s) will be the date of submission for purposes of determining compliance with

the requirements based on the time of filing the statement, including all certification requirements for statements under 37 CFR 1.97(e). See MPEP § 609.05(a).

***Drawings***

3. The drawings contained eight sheets of figures 1-11 were received on 12/8/06. These drawings are objected by the examiner for the following reasons.

4. The drawings are objected to as failing to comply with 37 CFR 1.84(p) (4) because reference character "300" has been used to designate both a laser and a lens as shown in each of figures 2 and 10. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

5. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the feature related to a wheel turning about an axis for placing a particular slider onto a light path as recited in claim 11 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

***Specification***

6. The abstract of the PCT/FR2004/000626 filed by applicant is used as an abstract of the U.S. application. The abstract of the disclosure is objected to because the term 'said' is used. Correction is required. See MPEP § 608.01(b).
7. Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that

the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

8. The lengthy specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.

9. The specification is objected to because it does not have a summary of the invention. Appropriate correction is required.

10. The disclosure is objected to because of the following informalities: a) Page 1: lines 11 and 15, the reference "300" has been used to refer to two different elements, i.e., a lens as stated on line 11 and an array as stated on line 15; b) Page 2: line 4, "arrivreach" contains at least one typo; c) Page 7: line 31, "Figure 7" should be changed to -Figure 6--; d) Page 9: line 17, "800" should be changed to -806--. See figure 11. There are still some grammatical and idiomatic errors in the specification. Applicant should carefully proofread the specification. Appropriate correction is required.

***Claim Objections***

11. Claims 1-2 and 4-12 are objected to because of the following informalities.

Appropriate correction is required.

a) Claim 1 is objected due to the claim language being used inaccurate.

First, it is noted that a broad range or limitation together with a narrow range or limitation that falls within the broad range or limitation (in the same claim) is considered indefinite, since the resulting claim does not clearly set forth the metes and bounds of the patent protection desired. See MPEP § 2173.05(c). Note the explanation given by the Board of Patent Appeals and Interferences in *Ex parte Wu*, 10 USPQ2d 2031, 2033 (Bd. Pat. App. & Inter. 1989), as to where broad language is followed by "such as" and then narrow language. The Board stated that this can render a claim indefinite by raising a question or doubt as to whether the feature introduced by such language is (a) merely exemplary of the remainder of the claim, and therefore not required, or (b) a required feature of the claims. Note also, for example, the decisions of *Ex parte Steigewald*, 131 USPQ 74 (Bd. App. 1961); *Ex parte Hall*, 83 USPQ 38 (Bd. App. 1948); and *Ex parte Hasche*, 86 USPQ 481 (Bd. App. 1949). In the present instance, claim 1 recites the board recitation related to a plurality of illuminating beams, a plurality of points to be illuminated by the plurality of illuminating beams, and a plurality of microscope holes, see lines 17-19, and the claim also recites an illuminating beam, a point to be illuminated by the illuminating beam, and a microscope hole, see lines 2-4, which is the narrower statement of the range/limitation.

Should the feature thereof "an illuminating beam coming from an illumination source (300) and focused on said point, and for focusing on a microscope hole (306) associated with the illuminating point a beam to be detected coming from the illuminating point" (lines 2-5) be changed to

--at least one illuminating beam coming from an illumination source (308) and focused on said at least one point, and for focusing on at least one microscope hole (306) associated with the at least one illuminating point a beam to be detected coming from the at least one illuminating point-- to make the claim comply with the requirement of 35 USC 112, second paragraph?

Second, It is also suggested that the term "Confocal" appeared on line 1 be changed to --A confocal--; and on line 18, the term "Characterised" be changed to --characterized--.

b) In each of claims 2, and 4-5: on line 1 of each claim, the term "Optical" should be changed to --The optical--. See claim 1, on line 1.

c) In each of claims 6-11: on line 1 of each claim, the term "Device" should be changed to --The optical device--.

d) In claim 9: on line 4, the feature "the optical path" lacks a proper antecedent basis. Should the mentioned feature be changed to --the at least one illuminating beam--. Note that the mentioned suggest to claim 9 is raised in case that applicant has accepted the changes to claim 1 as suggested by the examiner in the above element a).

In claim 12: the following corrections are suggested to the claim.



First, on line 1, "beamsplitter" should be changed to --The beamsplitter--;

Second, on line 5, the term "a" appeared before each of terms "first" and "second" should be changed to --the--; and

Third, on line 9, "a redirection mirror" should be changed to --the redirection mirror--.

***Allowable Subject Matter***

12. Claims 1-2 and 4-12 would be allowable if rewritten or amended to overcome the objections under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action.

13. The following is a statement of reasons for the indication of allowable subject matter:

The confocal optical device as recited in the independent claim 1 is patentable with respect to the prior art, in particular, the Publication No. 2002/0097485 and the U.S. Patent Nos. 5,625,494 and 6,288,382 by the limitations related to a confocal optical device having a beamsplitter and a redirection mirror attached to the beamsplitter wherein the beamsplitter is for reflecting a second light beam and for passing a first light beam, and the redirection mirror is for reflecting the second light beam, and wherein the device is used for illuminating a plurality of points using a plurality of illuminating beams and for focusing on a plurality of microscope holes the beams to be detected coming from the plurality of illuminated points. It is noted that while the use of a single unit for supporting both a beamsplitter and a redirection mirror into a single unit is disclosed in the mentioned Publication; however, the mentioned publication does not disclose the

feature that the beamsplitter is for reflecting a second light beam and for passing a first light beam, and the redirection mirror is used for reflecting the second light beam and the single unit having the beamsplitter and the redirection mirror is used for illuminating a plurality of points using a plurality of illuminating beams and for focusing on a plurality of microscope holes the beams to be detected coming from the plurality of illuminated points. The Patent No. 6,288,382 discloses a microscope system having a plurality of illuminating points and a plurality of pinholes; however, the Patent does not disclose a device having a beamsplitter and the redirection mirror attached to the beamsplitter wherein the beamsplitter is for reflecting a second light beam and for passing a first light beam, and the redirection mirror is for reflecting the second light beam. The Patent No. 5,625,494 discloses a parallel window having a beamsplitter and a redirection mirror attached thereon; however, the Patent does not disclose that the parallel window is used in a microscope with the features recited in the independent claim 1.

### ***Conclusion***

14. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.
15. This application is in condition for allowance except for the following formal matters:

See the objections to the abstract, the drawings, the specification and the claims as set forth in this Office action.

Prosecution on the merits is closed in accordance with the practice under *Ex parte Quayle*, 25 USPQ 74, 453 O.G. 213, (Comm'r Pat. 1935).

A shortened statutory period for reply to this action is set to expire **TWO MONTHS** from the mailing date of this letter.

16. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thong Nguyen whose telephone number is (571) 272-2316. The examiner can normally be reached on M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Stephone B. Allen can be reached on (571) 272-2434. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Thong Nguyen/

Primary Examiner, Art Unit 2872

